REMARKS

Claims 16, 19, 20 and 23-31 were examined in the Office Action mailed March 22, 2007. The Applicants note with appreciation the indication that claims 19, 20, 23 and 29 would be allowable if rewritten into independent form.

The following objections and rejections are pending:

- Objection to the Specification for mis-numbered paragraphs.

- Rejection of claims 16, 19-20 and 23-31 under 35 U.S.C. § 112, first paragraph, as failing to comply with the enablement requirement.

- Rejection of claims 16, 24, 26 and 30-31 under 35 U.S.C. § 103(a) as unpatentable over U.S. Patent No. 6,314,383 B1 ("Leimbach") in view of International Patent Publication No. WO 99/06809 ("Lukar").

- Rejection of claims 25 and 27-28 under § 103(a) as unpatentable over Leimbach and Lukar, further in view of U.S. Patent Publication No. US 2001/0029419 A1 ("Matsumoto").

1. **A Corrected Substitute Specification Is Being Filed.** The Applicants are filing herewith a substitute specification (and marked-up version) to correct the paragraph numbering issue.

2. **The Claims Are Enabled Under § 112, First Paragraph.**

Determining Vehicle Acceleration: In response to the assertion that original paragraph [0014] does not describe the step of determining a vehicle acceleration from at least a time differential of vehicle speed, a slope descending angle and a rolling resistance coefficient, the Applicants respectfully draw the Examiner's attention to the first sentence of original paragraph [0014] (now paragraph [0015]).

This sentence identifies the constituents of an equation in the form of

"m=f/a": "m 130 = (F_{motor} - F_{rot} - $F_{air\ resistance}$ - F_{brake}) 110 / *(dv/dt + g ·sin(ß) + g ·*

c_{roll}) 120." Specification ¶ [0015] (emphasis added). The sentence further

identifies the elements of this equation, stating that the vehicle acceleration "is

replaced by" the elements listed in paragraph [0015], with "the time-related

differential 122 of the vehicle speed "v" replac[ing] the acceleration "a_{eff}", "c_{roll}"

reflect[ing] the rolling resistance coefficient of the vehicle 126 and "g" stand[ing]

for the acceleration due to gravity (9.81 m/s²)." When g is multiplied by the sine

of the slope descending angle ("sin (ß)") (*i.e.*, the paragraph [0015] equation's "g ·

sin(ß)" term), one obtains the acceleration component due to the slope descending

angle; similarly, multiplying g by c_{roll} (*i.e.*, the paragraph [0015] equation's "g ·

c_{roll}" term), one obtains the acceleration due to rolling resistance. Thus, all of the

recited terms of the claim 16 method step are expressly enabled in the original

specification.

As to enablement of the use of these terms in a "step," the Applicants

respectfully submit that one of ordinary skill in the art would *instantly* recognize

that in order to calculate the "a" component (the vehicle acceleration) of the

"m=f/a" equation, one must execute a step of determining "a" from the terms

described in paragraph [0015], *i.e.*, the recited time differential of speed (dv/dt),

the slope descending angle (g · sin(ß)), and the rolling resistance coefficient (g ·

c_{roll}) must be calculated and summed. Accordingly, the Applicants submit the

specification satisfactorily enables this aspect of claim 16. Because the original

specification teaches a calculation which includes the step of determining a

vehicle acceleration from a time differential of vehicle speed, a slope descending

angle, and a rolling resistance coefficient ("(dv/dt + g · sin(ß) + g · c_{roll})"), the

Applicants request the pending enablement rejection be withdrawn.

Determining a Collective Mass Value: In response to the assertion that

paragraph [0016] does not enable "determining a collective mass value from the

stored plurality of mass values," the Applicants respectfully submit that

paragraph [0016] teaches one of ordinary skill to store and use stored mass

estimate values for calculation of a collective mass value as recited in claim 16.

Claim 16 recites, *inter alia*, "obtaining a plurality of vehicle mass values

from a plurality of driving situations;" "storing each of the plurality of vehicle

mass values;" and "determining a collective mass value from the stored plurality

of vehicle mass values ... ."

Original Paragraph [0015] (now paragraph [0016]) first noted that "[t]he

novel idea with this approach ... is that depending on the driving situation the

gradient resistance as well as the braking force are determined and taken into

account *and that in addition different driving situations are used for*

safeguarding other results." The paragraph then further noted that "[a] greater

accuracy and reliability of the mass estimation ... can be obtained through the

evaluation of as many occurring situations as possible and if necessary

subsequent varying weighting ... ." This is accomplished by "compar[ing] the

respectively best results *from as many measurements as possible* with each other

and to obtain a better result for the vehicle mass from these observations."

Reading this disclosure, one of ordinary skill in the art would recognize

that in order to "evaluat[e] as many occurring situations as possible" in order to

use "different driving situations ...for safeguarding other results" by "comparing ...as many occurring situations as possible," some form of results storage must necessarily occur, in order for the multiple evaluation results to be available to calculate the collective mass value. Accordingly, the Applicants respectfully submit that claim 16's reference to storing the plurality of mass values and determining a collective mass value from the stored values is sufficiently supported by the original specification, and one of ordinary skill could readily practice this aspect of the invention. Accordingly, withdrawal of this portion of the § 112, first paragraph rejection is respectfully requested.

3. The Lukar Reference Is The Parent Of The Previously Cited Lalor Reference, And The Claims Remain Patentable Over This Disclosure.

The Applicants respectfully traverse the rejection of claims 16, 24, 26 and 30-31 under § 103(a) as unpatentable over Leimbach in view of Lukar, and claims 25 and 27-28 under § 103(a) as unpatentable over Leimbach and Lukar, further in view of Matsumoto.

The Applicants note that the newly-cited Lukar reference, WO 99/06809, is the International publication corresponding to the previously cited Lalor reference, U.S. Patent No. 6,332,354 B1 (the WO 99/06809 document is cited on the face of the Lalor U.S. Patent). The pending Office Action does not refute or otherwise respond to the Applicants' December 14, 2006 remarks demonstrating that the pending claims are patentable over Leimbach and Lalor (aka Lukar). Accordingly, for the reasons set forth in the Applicants' December 14, 2006 remarks, the Applicants respectfully maintain that the pending claims continue

to be patentable over these references under § 103(a). Reconsideration and withdrawal of the pending § 103(a) rejections is respectfully requested.

CONCLUSION

In view of the foregoing remarks, the Applicants respectfully submit that claims 16, 19, 20 and 23-31 are in condition for allowance. Early and favorable consideration, and issuance of a Notice of Allowance for these claims is respectfully requested.

If there are any questions regarding this amendment or the application in general, a telephone call to the undersigned would be appreciated since this should expedite the prosecution of the application for all concerned.

If necessary to effect a timely response, this paper should be considered as a petition for an Extension of Time sufficient to effect a timely response, and please charge any deficiency in fees or credit any overpayments to Deposit Account No. 05-1323 (Docket #080437.52816US).

Respectfully submitted,

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